UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/568,440	02/14/2006	Hideyuki Shimonishi	Q93191	1002

23373   7590   07/08/2009
SUGHRUE MION, PLLC
2100 PENNSYLVANIA AVENUE, N.W.
SUITE 800
WASHINGTON, DC 20037

EXAMINER
NG, FAN

ART UNIT	PAPER NUMBER
2416	

MAIL DATE	DELIVERY MODE
07/08/2009	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE _3_ MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on _16 April 2009_.

2a)☒ This action is **FINAL**.   2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) _1-38_ is/are pending in the application.

     4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) _1-4,6-8,15-23,25-27,31 and 33-38_ is/are rejected.

7)☒ Claim(s) _5, 9-14,24, 28-30, 32_ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on _14 February 2006_ is/are: a)☒ accepted or b)☐ objected to by the Examiner.

     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

     a)☒ All   b)☐ Some *   c)☐ None of:

       1.☒ Certified copies of the priority documents have been received.

       2.☐ Certified copies of the priority documents have been received in Application No. _____.

       3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

     * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)

2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
     Paper No(s)/Mail Date _02/14/2006, 03/15/2006, 12/04/2008, 01/07/2009_.

4) ☐ Interview Summary (PTO-413)
     Paper No(s)/Mail Date. _____ .

5) ☐ Notice of Informal Patent Application

6) ☐ Other: _____.

DETAILED ACTION

Response to Arguments

Applicant's arguments filed 04/16/2009 have been fully considered but they are not persuasive. And this office action is made final, because same prior art are used to reject all the amended claims and previously rejected (see below for the response to the arguments), moreover, previously indicated allowable claims are still allowable.

Applicant argued on page 23, 1st paragraph that Sandoval fail to teach: reception session processing means, second, transmission buffering means and transmission session processing means.

The examiner respectively disagrees:

First, **element #122** in Sandoval's fig.1 is reception session processing means because **#122** receives the packet from transmission terminal **#102** and processes the packet to the receiver **#108**.

Second, transmission buffering is inside the transmission terminal **#102**, because sender must have buffer to store its data before transmission.

Third, in **Fig. 1, (#120)** is transmission session processing means, because it receives data from reception terminal **#104**.

Response to Amendment

Foreign priority is granted and indicated on the action summary sheet.

Claims objection about the phrase "characterized" has been overcome.

101 rejection has been overcome.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

1.   Claims 1-4, 6-8, 15-23, 25-27, 31, 33-38 are rejected under 35 U.S.C. 103(a) as

being unpatentable over Sandoval (6990073) in view of Tobagi et al. (20020080721).

Regarding to amended claim 3, 15, 22, 34 Sandoval teaches reception session **(Fig. 1,**

#122: the reception session) processing means for receiving data from the

transmission terminal **(reception session #122 is receiving data from #102 the**

transmission terminal),

Transmission buffering means for temporarily storing the data received from the

transmission terminal **(transmission terminal is inside #102, which can be the**

source of the data) in a transmission buffer **(it is inherent that a transmission**

terminal has a transmission buffer and this buffer stored the data from the

source, note both #transmission buffer and transmission terminal are inside

#102),

Transmission session **(#120)** processing means for receiving data from the reception

terminal **(transmission session #120 is receiving data from #104 the reception**

terminal),

Wherein the transmission session **(#120)** processing means calculates an amount of

transmissible data **(Fig. 2, #132 the number of packet stored in #126 is monitored**

(calculated), here the transmissible data is the data stored in #126) based on the

data based on the data received from the reception terminal **(the calculation is based**

on the data received from Fig. 1, #104 (the reception terminal));

Packet scheduling means for controlling delivery of the data stored in the transmission

buffer **(Fig. 2, #146, #150 the sender (transmission buffer) is notified (controlled))**,

based on the amount of transmissible data **(the controlling is based on the**

transmissible data #126); and

Delivery control means for delivering the data stored in the transmission buffer in response to the control of the packet scheduling means **(Fig. 2, #142, permit additional packet into the buffer, where the packet is delivery from transmission buffer inside #102 to #126)**.

Where Sandoval does not have a packet scheduling component, but Tobagi teaches the packet scheduling at **(Fig. 6, #610)**. Thus, it would have been obvious for one of ordinary skill in the art to implement Tobagi into Sandoval, since both arts are in the same field of endeavor and Sandoval suggest a method to reduce congestion and has the function of packet scheduling as described in claim 3, but Sandoval does not disclose an packet scheduling component in the relay and Tobagi teaches the actual component of packet scheduling, since one has the functionality and one has the actual component, they would have been obvious to combine.

Regarding to claim 25, Sandoval and Tobagi teaches claim 22, Sandoval teaches in **fig. 1, #126** the buffer is for accumulating unused resource and it is obvious that there will be buffer in the sender and receiver, since data needs memory to hold. Furthermore, buffer is to facilitate the communication between terminals.

Regarding to claim 26, Sandoval and Tobagi teaches claim 25, Sandoval teaches in **fig. 2**, that if data in the buffer **#126** is above threshold than, it will free some of the space by restriction on the amount of transmissible data, fig. 2, #146, #150.

Regarding to claim 27, Sandoval and Tobagi teaches claim 22, Sandoval teaches in **fig. 2** that is dynamically changing control parameter (stop, slow, full rate of transmission), depends on the data delivery in the buffer.

Regarding to claims 1-2, 4, 6-8, 16-21, 23, 35-38 have not been changed scope after amendment, and the prior art to use reject the independent claim that they depends on is the same as first office action, thus please refer to the first office action for their rejection.

Regarding to claims 31, 33 which depends on claims 22-29, and amount 22-29, there are allowed and rejected claims, thus 31, 33 stay rejected. Furthermore, the scope of 31, 33 have not been changed, and the prior art use to reject the independent claim is the same as first office action, thus please refer to the first office action for their rejection.

Allowable Subject Matter

2.   Claims 5, 9-14, 24, 28-30, 32 are objected to as being dependent upon a

rejected base claim, but would be allowable if rewritten in independent form including all

of the limitations of the base claim and any intervening claims.

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy

as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE

MONTHS from the mailing date of this action. In the event a first reply is filed within

TWO MONTHS of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the

shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

the advisory action. In no event, however, will the statutory period for reply expire later

than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Fan Ng whose telephone number is (571) 270-3690.

The examiner can normally be reached on Monday-Friday; 7:30am-5:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Chi H. Pham can be reached on (571) 272-3179. The fax phone number for

the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the

Patent Application Information Retrieval (PAIR) system. Status information for

published applications may be obtained from either Private PAIR or Public PAIR.

Status information for unpublished applications is available through Private PAIR only.

For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

you have questions on access to the Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a

USPTO Customer Service Representative or access to the automated information

system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/F. N./
Examiner, Art Unit 2416

/Chi H Pham/
Supervisory Patent Examiner, Art
Unit 2416
6/12/09